

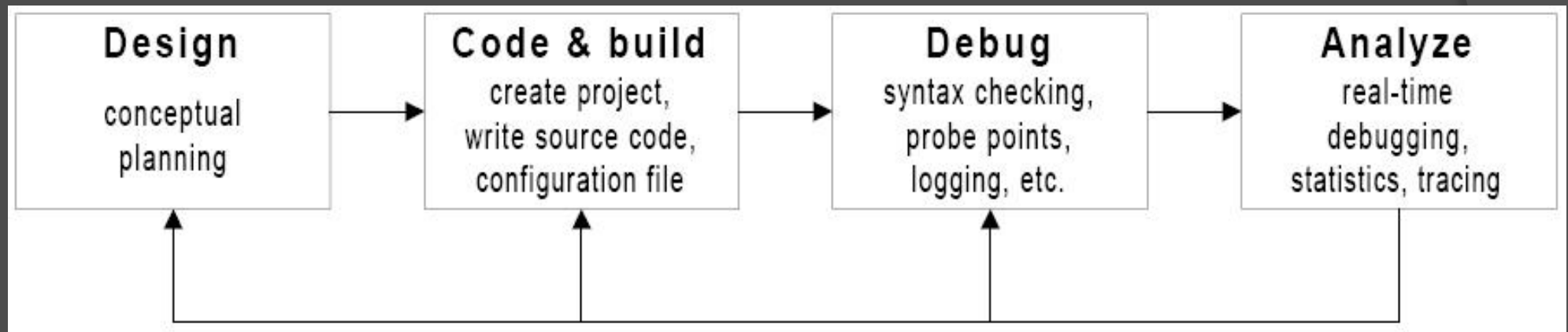
D. Richard Brown III
Associate Professor
Worcester Polytechnic Institute
Electrical and Computer Engineering Department
drb@ece.wpi.edu

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ECE4703 REAL-TIME DSP LAB SOFTWARE OVERVIEW



Code Composer Studio IDE



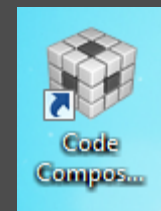
Note that we will be using CCS v4.2.4.

CCS v4 is based on the Eclipse IDE

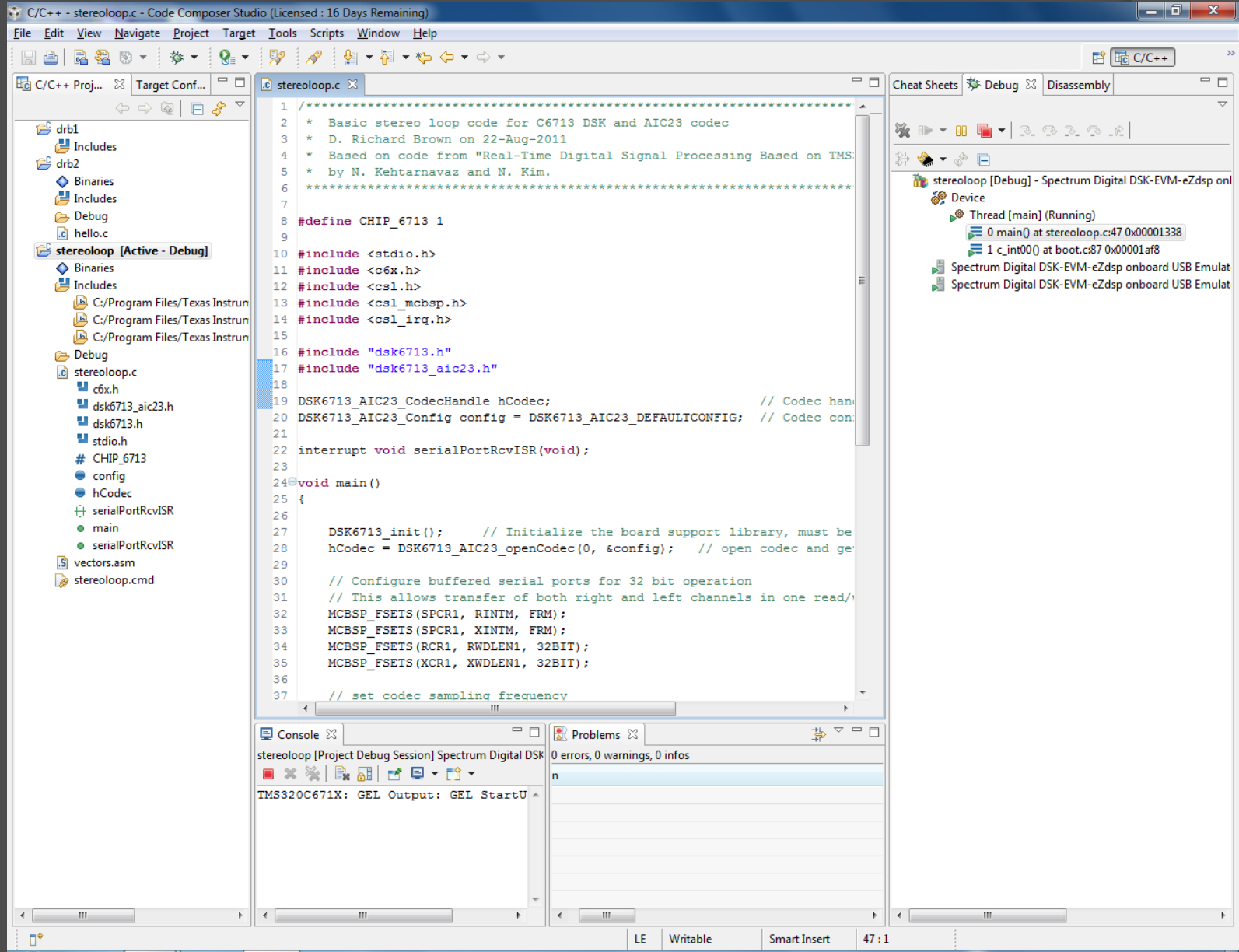
http://processors.wiki.ti.com/index.php/Eclipse_Concepts

Code Composer Studio IDE

- Connect power supply to DSK
- Wait for POST to complete
- Connect USB cable from PC to DSK
 - If this is the first time connecting the DSK, Windows may install a driver. This should happen automatically.
- Launch Code Composer Studio v4
- CCS will load and wait for your input



Code Composer Studio IDE



Licensing Issues?

- ⦿ CCS v4 may ask for a license file
- ⦿ Please see the TA or the instructor and we will fix this

CCS Workspace

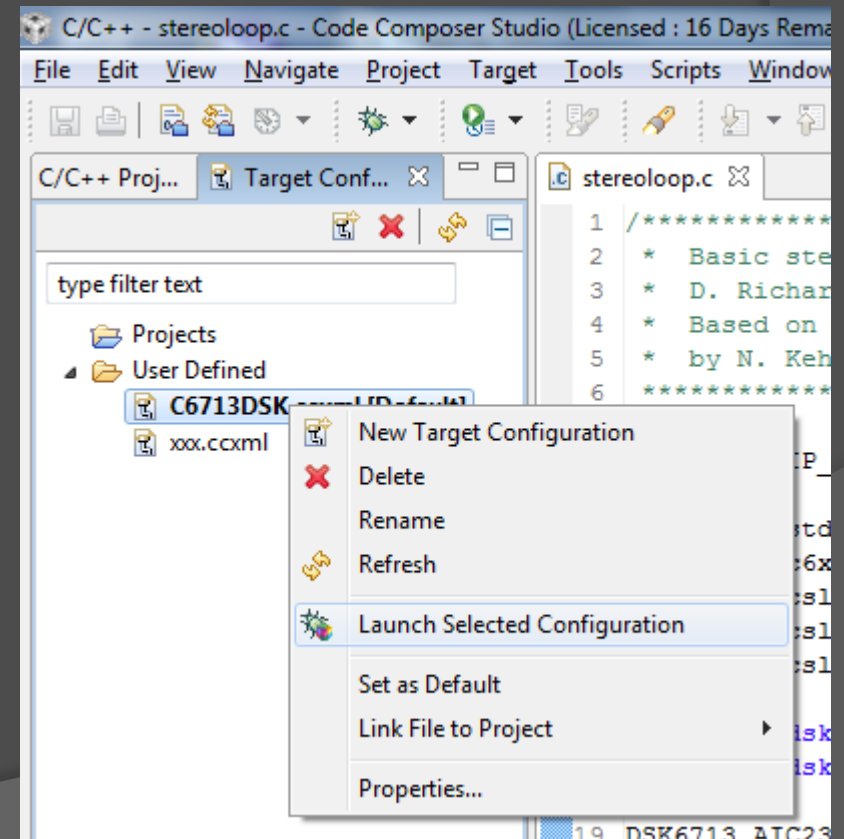
- Please use your M: drive for your CCS workspace
- Recommended workspace path:
M:\ECE4703\labN
where N is the current lab number
- Each part of the project will then be in a subpath like
M:\ECE4703\lab I \part I \
- Note: CCS will not work with long drive names, e.g. [\\ece-homes.ece.wpi.edu\](#). You must use M:.

CCS v4 Initial Configuration

- If this is the first time CCS v4 is run, you will need to set up target configuration for C6713DSK
- Details here:
http://spinlab.wpi.edu/courses/ece4703_2011/configureccsv4.html

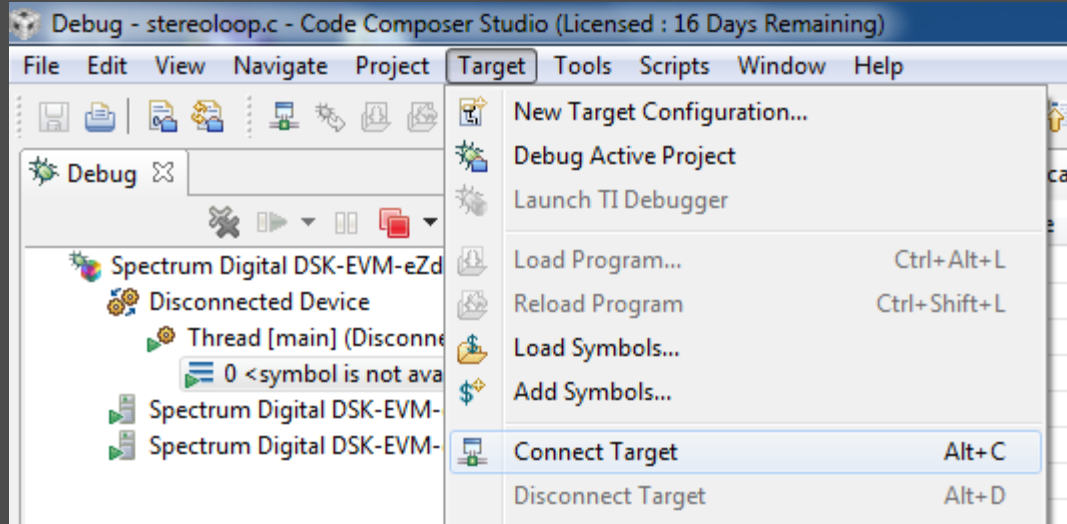
Launching Target Configuration

- Window -> Show View -> Target Configurations
- Right click on your C6713DSK.ccxml target configuration
- Launch selected configuration

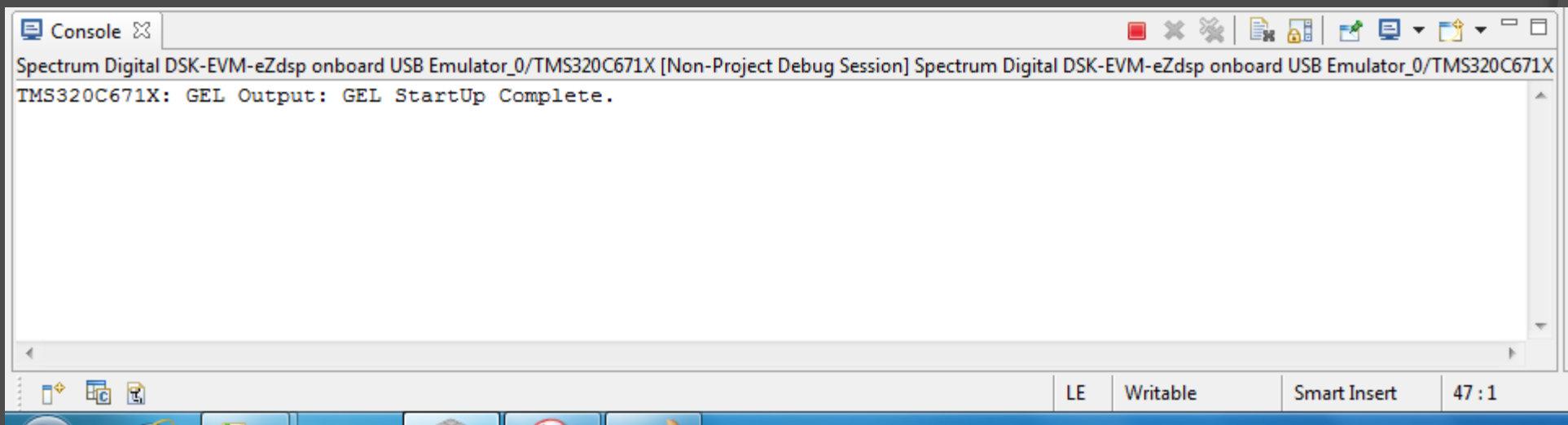


Connecting to the C6713 DSK

- Target -> Connect Target (or Alt+C)



- If successful, you should see this in the console



Goals for Today

- Get familiar with DSK and lab hardware
- Get familiar with CCS v4
- Get Helloworld project working (Lab I, part I)
http://spinlab.wpi.edu/courses/ece4703_2011/helloworld.html
- Get Stereoloop project working (Lab I, part2)
http://spinlab.wpi.edu/courses/ece4703_2011/stereoloop.html
- Start part 3 of the lab I assignment

Does your Stereoloop project work?

- Try playing some music into the line input of the DSK.
- Plug headphones in the headphone output of the DSK.
- If your code is running correctly, you should hear the music in the headphones.
- Halt your code. The music should stop.
- This code simply reads in samples from the line input jack and outputs them (unmodified) to the line output and headphone jacks.
- This code doesn't actually do any signal processing, but it will serve as a template for most of the DSP programs you will write in ECE4703.